

**DETAILED ACTION**

***Continued Examination Under 37 CFR 1.114***

1. A request for continued examination under 37 CFR 1.114, including the fee set forth in 37 CFR 1.17(e), was filed in this application after final rejection. Since this application is eligible for continued examination under 37 CFR 1.114, and the fee set forth in 37 CFR 1.17(e) has been timely paid, the finality of the previous Office action has been withdrawn pursuant to 37 CFR 1.114. Applicant's submission filed on 12/21/10 has been entered.

***Acknowledgments***

2. This office action is in response to the reply filed on 12/21/10.
3. Claims 1-35 are pending with claims 1-17 being withdrawn.

***Claim Rejections - 35 USC § 103***

4. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:
  - (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.
5. **Claims 18-22, 26-29, 31-35 are rejected under 35 U.S.C. 103(a) as being unpatentable over Jacobsen et al. (US 4,250,878) ("Jacobsen") in view of Sun et**

al. (US 2002/0115957) ("Sun"). Jacobsen discloses a porous structure 82, 86 capable of absorbing and holding at least 30% w/w aqueous solutions without dissolving or disintegrating C5L21-22, the porous structure comprising a surface area of contact 82 with the tissue C5L16-20.

6. Jacobsen discloses the invention as substantially claimed; however, Jacobsen does not directly disclose a data transmitting module capable to transmit data indicative of one or more of sponge size and surface area of contact of the sponge with tissue of a subject are intended use limitations. Sun, in the analogous art, teaches a data transmitting module [0087]. Therefore, it would have been obvious to a person having ordinary skill in the art at the time the invention was made to have modified the device of Jacobsen with the data transmitting module to ensure safety of the delivery operation. The transmitting module of Sun is a chip 622, Fig. 6. It is inherent that the transmitting module is coated with a water protecting coat as to not disrupt the electronic conductivity with the electronic control unit 626 and conductive wire 624. The chip is a type of micro transmitter.

The porous structure of Jacobsen could also comprise a non-hydrophilic polymer such as polyurethane and a hydrophilic substance having at least one functional group such as a hydroxyl group [0050] as taught by Sun.

The object of Jacobsen is to by iontophoresis, delivery a chemical species into the skin or tissue of a person and to provide such a method and bioelectrode which may be used on irregular skin surfaces to facilitate substantially uniform contact with skin surfaces having a variety of shapes C1L65-C2L10. Thus, it the examiner's position that

Art Unit: 3767

the device of Jacobsen could be used on eye tissue being sclera tissue or cornea tissue; the surface area of contact being a substantially planar surface.

Jacobsen discloses the delivery of a charged drug, see abstract, but does not further disclose specific chemical species to be delivered. The sponge (reservoir) of Sun comprises a charged drug [0050] such as an anesthetic [0003]; or an antibiotic such as gentamycin [0027] for delivery.

**7. Claims 23-25, 30 are rejected under 35 U.S.C. 103(a) as being unpatentable over Jacobsen in view of Sun further in view of Nicolais et al. (US 5,645,592) ("Nicolais").**

Jacobsen/Sun discloses the invention as substantially claimed (see above). However, the sponge of Jacobsen/Sun is not specifically disclosed as being comprised of a HEMA-methyl methacrylate copolymer. Sponges and hydrogels are known equivalents to those skilled in the art. Nicolais, in the analogous art, teaches the use of a hydrogel comprised of a HEMA-methyl methacrylate copolymer C7L20-44 in order to increase water absorption. Therefore, it would have been obvious to a person having ordinary skill in the art at the time the invention was made to have modified the sponge of Jacobsen/Sun by coating it with HEMA-methyl methacrylate copolymer as taught by Nicolais for the purpose of increasing water absorption.

Claim 30 is interpreted as a product by process claim (see MPEP 2113) which is read as a product claim. Thus, the sponge of Jacobsen/Sun/Nicolais is made of a hydroxyl methyl acrylate and ethylene glycol dimethacrylate copolymer.

***Response to Arguments***

8. Applicant's arguments have been fully considered but they are not persuasive. Applicant argues that Jacobsen does not teach or suggest a sponge having surface area of contact with the tissue. It is noted that the features upon which applicant relies (i.e., that the **sponge** is not capable of having direct contact with a tissue) are not recited in the rejected claim(s). Although the claims are interpreted in light of the specification, limitations from the specification are not read into the claims. See *In re Van Geuns*, 988 F.2d 1181, 26 USPQ2d 1057 (Fed. Cir. 1993). Examiner maintains that the porous structure of Jacobsen (80 as a whole could be interpreted as the porous structure) comprises a surface area 82 of contact with the tissue.
9. Applicant further argues that neither Jacobsen nor Sun teach or describe a transmitter configured and operable to transmit data indicative of one or more of sponge size and the surface area of contact of the sponge with the tissue of the subject. This argument is not persuasive. A recitation of the intended use of the claimed invention must result in a structural difference between the claimed invention and the prior art in order to patentably distinguish the claimed invention from the prior art. If the prior art structure is capable of performing the intended use, then it meets the claim. Here, the sensor 622 of Sun is capable of being configured to transmit and analyze data of any type or form as well known in the art.

***Conclusion***

Any inquiry concerning this communication or earlier communications from the examiner should be directed to DEANNA K. HALL whose telephone number is (571)272-2819. The examiner can normally be reached on M-F 11:00am-7:30pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Kevin Sirmons can be reached on 571-272-4965. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/Deanna K. Hall/  
Examiner, Art Unit 3767  
2/23/11  
/KEVIN C. SIRMONS/  
Supervisory Patent Examiner, Art Unit 3767